Washington Latin

A.P. Calculus

1. Factor the following:

a. *x2 + 6x + 8* b. *x2 + 12x + 7*

*c. x2 - 9x + 14 d. x2 - 11x - 60*

*e. x2 - 25x + 100 f. x2 -32x - 105*

2. Solve the following equations for *x* by factoring:

a. *x2 - 2x - 80 = 0* b. *x2 + 8x + 16 = 0*

*c. x2 + 12x + 7 = 0 d. x2 - 10x - 39 = 0*

*e. 4x2 + 13x - 27 = 3(x - 5) - 6x + 8 + 3x2*

f. - *x2 - 13x + 30 = 0*

3. Without using your calculators, graph the following quadratics on graph paper.

a. *y = x2 + 12x + 7 b. y = x2 - 4x + 1*

*c. y = -x2 + 6x + 7 = 0*

4. Find the zeros of the following functions using the quadratic formula:

a. *f(x) = x2 + 11x + 7 = 0 b. g(x) = x2 - 5x + 9*